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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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EXAMINER

HUA, LY

ART UNIT PAPER NUMBER

2135

DATE MAILED: 08/03/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/800,731

Applicant(s)

STEVENS

Examiner

Ly V. Hua

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-7 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1-7 is/are rejected.
- 7) ☐ Claim(s) ____ is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on ____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. ____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. ____. |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date ____. | 6) <input type="checkbox"/> Other: ____. |

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DETAILED ACTION***Claim Rejections - 35 USC § 112***

1. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

2. Claims 1-7 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

- a. With regard to claim 1:

- i. The phrase "the other party" at line 13 lacks antecedent basis.
- ii. The phrase "the communication" at lines 13-14 lacks antecedent basis.
- iii. The phrase "the playback" at line 16 lacks antecedent basis.
- iv. The phrase "the cipher communication" at lines 17-18 lacks antecedent basis.
- v. The phrase "the other party" at line 20 lacks antecedent basis.
- vi. The phrase "the communication" at line 20 lacks antecedent basis.
- vii. The phrase "the storage contents" at line 25 lacks antecedent basis.
- viii. This claim is incomplete for omitting essential structural cooperative relationships of elements, such omission amounting to a gap between the necessary structural connections. See MPEP § 2172.01. The omitted structural cooperative relationships are:
 - (1) The CPU recited in this claim 1 does not have connection to any other element and is not recited with any function.

- b. With regard to claim 2:

- ix. This claim depends on claim 1, inherits the problems of indefiniteness therefrom and thus is rejected with the same rationale.

- c. With regard to claim 5:

- x. It is not clear as to wherefrom the information are acquired.
- xi. There are insufficient antecedent basis for each of the following limitations in claim 5.
 - (2) The limitation "the apparatus and device information" in lines 3-4.
- xii. This claim is incomplete for omitting essential structural cooperative relationships of elements, such omission amounting to a gap; between the necessary structural connections. The omitted structural cooperative relationships are:
 - (3) The acquirement means does not have physical connection with the rest of the other elements.
 - (4) The means for selecting does not have physical connection with the rest of the other elements.
 - (5) The storage-device-retrieving-means does not have physical connection with the rest of the other elements.
 - (6) The apparatus-retrieving-means does not have physical connection with the rest of the other elements.

- d. With regard to claim 3:

- xiii. The phrase "the ... information" at lines 3-4 lacks antecedent basis.
- xiv. This claim is incomplete for omitting essential structural cooperative relationships of elements, such omission amounting to a gap; between the necessary structural connections. The omitted structural cooperative relationships are:

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- (7) The acquirement means does not have physical connection with the rest of the other elements.
 - (8) The means for selecting does not have physical connection with the rest of the other elements.
 - (9) The storage-device-retrieving-means does not have physical connection with the rest of the other elements.
 - (10) The apparatus-retrieving-means does not have physical connection with the rest of the other elements.
- e. With regard to claim 4
 - xv. It is not clear whether the key-storing-apparatus-retrieving means recited in this claim is the same or a different means relative to the key-storing-apparatus-retrieving means recited in this claim 3.
 - xvi. In lines 9-10, it is not clear whether the phrase "to said key storing apparatus" is used as a destination to which the key is moved or as a destination to which the instruction is transmitted.
- f. With regard to claim 6:
 - xvii. In the clause reciting the transmitting means in the hub apparatus, the following phrases lack antecedent basis:
 - (11) "the other party",
 - (12) "the communication" and
 - (13) "the cipher communication".
 - xviii. In the clause reciting the reading-and-detecting means in the hub apparatus, the following phrases lack antecedent basis:
 - (14) "the other party",
 - (15) "the communication",
 - (16) "the cipher communication" and
 - (17) "the storage contents".
 - xix. The "wherein" clause reciting the hub apparatus is incomplete for omitting essential structural cooperative relationships of elements, such omission amounting to a gap between the necessary structural connections. The omitted structural cooperative relationships are:
 - (18) The CPU recited in this claim 1 does not have connection to any other element and is not recited with any function.
 - xx. In the clause reciting the acquirement means in the controller, the following phrase lacks antecedent basis:
 - (19) "the ... information".
 - xxi. The "wherein" clause reciting the controller is incomplete for omitting essential structural cooperative relationships of elements, such omission amounting to a gap; between the necessary structural connections. The omitted structural cooperative relationships are:
 - (20) The acquirement means does not have physical connection with the rest of the other elements.
 - (21) The means for selecting does not have physical connection with the rest of the other elements.
 - (22) The storage-device-retrieving-means does not have physical connection with the rest of the other elements.
 - (23) The apparatus-retrieving-means does not have physical connection with the rest of the other elements.
- g. With regard to claim 7:
 - xxii. This claim depends on claim 6, inherits the problems of indefiniteness therefrom and thus is rejected with the same rationale.

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3. Claims 1-7 would be allowable if rewritten or amended to overcome the rejection(s) under 35 U.S.C. 112, second paragraph, set forth in this Office action.

4. The following is a statement of reasons for the indication of allowable subject matter: The prior art of record fail to teach or suggest the claimed invention as claimed.

- a. With regard to claims 1, 2, and 5, the prior art of record fail to teach of suggest a hub apparatus to which one or more storage devices and a contents reproducing apparatus can be electrically connected, said hub apparatus comprising:
 - i a CPU; and
 - ii a key storing apparatus
 - (1) for storing therein
 - (a) keys
 - (i) each of which
 - 1) is used to decode
 - a) encrypted contents data,
 - (2) wherein said key storing apparatus has:
 - (a) authentication means
 - (i) for authenticating
 - 1) said contents reproducing apparatus and said storage device
 - a) which are electrically connected to said hub apparatus;
 - (b) means
 - (i) for
 - 1) when said contents reproducing apparatus
 - a) is authenticated
 - i) as the other party of the communication
 - ii) by said authentication means,
 - 2) transmitting
 - a) the key corresponding to the encrypted contents data
 - b) as an object of the playback
 - c) to said contents reproducing apparatus
 - d) by utilizing the cipher communication; and
 - (c) means
 - (i) for
 - 1) when said storage device
 - a) is authenticated
 - i) as the other party of the communication
 - ii) by said authentication means,
 - 2) reading out
 - a) the key
 - i) to be transmitted to said storage device
 - b) to transmit
 - i) the key thus read out
 - ii) to said storage device
 - iii) by utilizing the cipher communication and
 - (ii) for deleting
 - 1) the key thus transmitted thereto
 - 2) from the storage contents.
- b. With regard to claims 3 and 4, the prior art of record fail to teach of suggest a controller which is electrically connected to a hub apparatus, comprising:
 - i acquirement means
 - (1) for acquiring
 - (a) the apparatus and device information of various kinds of apparatuses and devices
 - (i) which are electrically connected to said hub apparatus;
 - ii means
 - (1) for
 - (a) by utilizing said apparatus and device information,
 - (b) selecting

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- (i) a contents reproducing apparatus,
 - 1) which is used to reproduce the contents,
 - (ii) among said various kinds of apparatuses and devices
 - 1) which are electrically connected to said hub apparatus;
 - iii means
 - (1) for retrieving
 - (a) a contents storing device
 - (i) in which the encrypted contents data of said contents is stored;
 - iv means
 - (1) for retrieving
 - (a) a key storing apparatus
 - (i) in which a key
 - 1) which is used to decode said contents data
 - 2) is stored; and
 - v means
 - (1) for transmitting
 - (a) an instruction
 - (i) to reproduce said contents
 - (b) to said contents reproducing apparatus
 - (i) which is selected by said selection means.
- c. With regard to claims 6 and 7 the prior art of record fail to teach of suggest a contents reproducing system which manages the encrypted contents data and a key used to decode said encrypted contents data,
 - i said system comprising:
 - (1) a hub apparatus;
 - (2) a controller;
 - (3) a key storing apparatus which is electrically connected to said hub apparatus;
 - (4) a contents storing device which is electrically connected to said hub apparatus;
 - (5) a contents reproducing apparatus which is electrically connected to said hub apparatus,
 - ii wherein said hub apparatus includes:
 - (1) a CPU; and
 - (2) a key storing apparatus
 - (a) for storing therein
 - (i) keys
 - 1) each of which
 - a) is used to decode
 - i) encrypted contents data,
 - (b) wherein said key storing apparatus has:
 - (i) authentication means
 - 1) for authenticating
 - a) said contents reproducing apparatus and said contents storing device
 - i) which are electrically connected to said hub apparatus;
 - (ii) means
 - 1) for
 - a) when said contents reproducing apparatus
 - i) is authenticated as the other party of the communication by said authentication means,
 - b) transmitting
 - i) the key corresponding to the encrypted contents data
 - ii) as an object of the playback
 - iii) to said contents reproducing apparatus
 - iv) by utilizing the cipher communication; and
 - (iii) means
 - 1) for
 - a) when said storage device
 - i) is authenticated as the other party of the communication by said authentication means,
 - b) reading out
 - i) the key to be transmitted to said contents storing device
 - ii) to transmit the key thus read out to said contents storing device by utilizing the cipher communication and
 - 2) for deleting
 - a) the key thus transmitted thereto
 - b) from the storage contents, and

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- iii wherein said controller includes:
 - (1) acquirement means
 - (a) for acquiring
 - (i) the apparatus and device information of various kinds of apparatuses and devices
 - 1) which are electrically connected to said hub apparatus;
 - (2) means
 - (a) for
 - (i) by utilizing said apparatus and device information,
 - (ii) selecting
 - 1) said contents reproducing apparatus,
 - a) which is used to reproduce the contents,
 - 2) among said various kinds of apparatuses and devices
 - a) which are electrically connected to said hub apparatus;
 - (3) means
 - (a) for retrieving
 - (i) said contents storing device
 - 1) in which the encrypted contents data of said contents is stored;
 - (4) means
 - (a) for retrieving
 - (i) a key storing apparatus
 - 1) in which a key
 - a) which is used to decode said contents data
 - b) is stored; and
 - (5) means
 - (a) for transmitting
 - (i) an instruction
 - 1) to reproduce said contents
 - (ii) to said contents reproducing apparatus
 - 1) which is selected by said selection means.

5. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

6. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Ly V. Hua whose telephone number is (703) 305-9684. The examiner can normally be reached on Ly V. Hua from 9:00 AM to 5:30PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Vu Kim, can be reached on 305-4393. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).



Ly V. Hua
Primary Examiner
Art Unit 2135

lvh
July 24, 2004